коллективом и сплочить команду. В программу часов куратора введены темы рассмотрение, которых немыслимо без участия опытного психологапрофессионала. Например, такие как социометрия, стресс-менеджмент, целеполагание и т.д.

В этом случае занятия проводятся с участием психолога. По отзывам первого курса, проводимые тренинги психолога проходят с большой пользой для студентов. Работая такой командой, мы всячески поддерживаем первый курс и помогаем освоится в «новой жизни».

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THE CONDITIONS AND CHARACTERISTICS OF CLIMATE CHANGE

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It must be mentioned first that the Earth's climate has changed throughout history. Just in the last 650,000 years there have been seven cycles of ice age, with the sudden end of the last ice age about 7,000 years ago marking the beginning of the modern climate era, and of human civilization.

The current warming trend is very important because most of it is due to humans. Satellites and other technological devices have enabled scientists to see a bigger picture of the world, collecting many different types of information about our planet and its climate on a global scale. Analysis of this climate information shows us the signals of climate changes.

Carbon dioxide (CO₂) is an important heat-trapping, i.e. greenhouse, gas, which is released through human activities such as deforestation and burning fossil fuels, as well as natural processes such as respiration and volcanic eruptions. The heat-trapping nature of carbon dioxide and other gases was demonstrated already in the mid-19th century. It must be mentioned here that in the 1860s, physicist John Tyndall recognized the Earth's natural greenhouse effect and suggested that slight changes in the atmospheric composition could bring about climatic variations. In 1896, a seminal paper by Swedish scientist Svante Arrhenius first speculated that changes in the levels of carbon dioxide in the atmosphere could substantially alter the surface temperature through the greenhouse effect. Thus, there is no question that increased levels of greenhouse gases must cause the Earth to warm in response.

In this connection, some evidence of rapid climate change must be demonstrated.

First, there has been <u>Sea Level Rise</u>, which is primarily caused by two factors related to global warming: the added water from melting land ice and the expansion of sea water as it warms. Theglobal sea level rose about 17 centimeters in the last century. The rate in the last decade, however, is calculated to be nearly double that of the last century[see 1].

Second, the collected data proves the occurrence of <u>Global Temperature Rise</u>due to the fact that the Earth has warmed since 1880. Most of this warming occurred since the 1970s, with the 20 warmest years having occurred since 1981. Even though we witnessed a solar output decline resulting in an unusually deep solar minimum in 2007-2009, surface temperatures continue to increase.

Third, the <u>Warming Oceans</u>have already absorbed much of this increased heat, with the top 700 meters of the ocean showing a warming of 0.3 degrees Fahrenheit since 1969 [cf. 2].

Fourth, the <u>Shrinking Ice Sheets</u> of Greenland and Antarctica have decreased in mass. The data from the NASA's Gravity Recovery and Climate Experiment show that Greenland lost 150 to 250 cubic kilometers of ice per year between 2002 and 2006, while Antarctica lost about 152 cubic kilometers of ice between 2002 and 2005. Both the extent and thickness of the Arctic sea ice has also declined over the last several decades.

Fifth, <u>*Extreme Events*</u> have contributed to the issue, as well. Since 1950, the number of record high temperature events has been increasing, while the number of record low temperature events has been decreasing. For instance, the U.S. has witnessed increasing numbers of intense rainfall events [3].

Sixth, there has also been <u>Glacial Retreat</u>. Glaciers are considered among the most sensitive indicators of climate change [cf. 4]. Their size is determined by a mass balance between snow input and melt output. As temperatures warm, glaciers retreat unless snow precipitation increases to make up for the additional melt; the converse is also true. Glaciers are retreating almost everywhere around the world, including in the Alps, Himalayas, Andes, Rockies, Alaska and Africa [see 5].

Next, <u>Ocean Acidification</u> has likewise taken place. Since the beginning of the Industrial Revolution, the acidity of the surface ocean waters has increased by about 30 percent. This increase is the result of humans emitting more carbon dioxide into the atmosphere and hence more being absorbed into the oceans. The data from the NASA research center show that a mount of carbon dioxide absorbed by the upper layer of the oceans increases by about 2 billion tons per year [6].

Finally, the <u>Decreased Snow Cover</u> has also been marked. Satellite observations reveal that the amount of spring snow cover in the Northern Hemisphere has decreased over the past five decades and that the snow is melting earlier [cf. 7; 8].

As we see, the Earth's population is currently experiencing serious problems with climate. Unless people start carrying out actions for solving these problems, our future will be unclear.

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РАЗВИТИЕ ТЕХНИКИ В СОВРЕМЕННОМ МИРЕ: ФАКТОРЫ ПРОЯВЛЕНИЯ И ПУТИ ПРЕОДОЛЕНИЯ

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В современном мире техника оказывает значительное воздействие на все сферы человеческой жизнедеятельности, ведь по мнению многих исследователей, именно развитие техники сформировало современную цивилизацию. Технологическая экспансия вызвала широкую полемику о целях и перспективах технического развития, о мерах его контроля и возможного ограничения. Современные исследователи все более склонны считать, что именно благодаря развитию техники и технологий человечество идет навстречу глобальной катастрофе, избегнуть которую можно, только приняв соответствующие меры, направленные, прежде всего на ограничение, регулирование роста производства, добычу и производство природных ресурсов. [1, с. 8]

Очевидно, что сегодня нельзя говорить об однозначной трактовке роли техники в современном мире. Теоретики условно разделяются два полярных круга оценивая роль техники и влияние техники на современное общество. С одной